

# MDE Smart Salting Training Program in Maryland

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Maryland Department of the Environment

Water and Science Administration

Watershed Protection, Restoration, and Planning Program



**Chesapeake Bay Program's Scientific and Technical Advisory Committee Workshop**

**State of the Science of Salinity Risks in the Chesapeake Bay and Its Tributaries: Connecting Monitoring, Modeling and Management**

**Session IV: Management Strategies & Freshwater Salinization Syndrome**

**May 27, 2026**

# MARYLAND'S SALT REDUCTION

## Strategies

Winter salt, primarily composed of sodium chloride, is applied to paved surfaces to prevent snow and ice from sticking to roads, parking lots, and sidewalks. Just like when you add oil to a frying pan to keep your egg from sticking. Winter salt is typically applied as rock salt or as a salt brine. Runoff from surfaces treated with winter salt tends to have very high chloride concentrations causing disruptions to aquatic life, contaminating drinking water, damaging roads, and household pipes.

1

State law requiring Salt Management Plan implementation for the State Highway Administration

2

Require Salt Management Plans and implementation for areas covered under stormwater permits [Municipal Separate Storm Sewer System (MS4)]

3

Voluntary applicator training

4

Education through MDE's winter salt web pages and local government outreach efforts required in their MS4 permits

5


Permit requirements for other potential point sources



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<https://bit.ly/MDEsaltsmart>

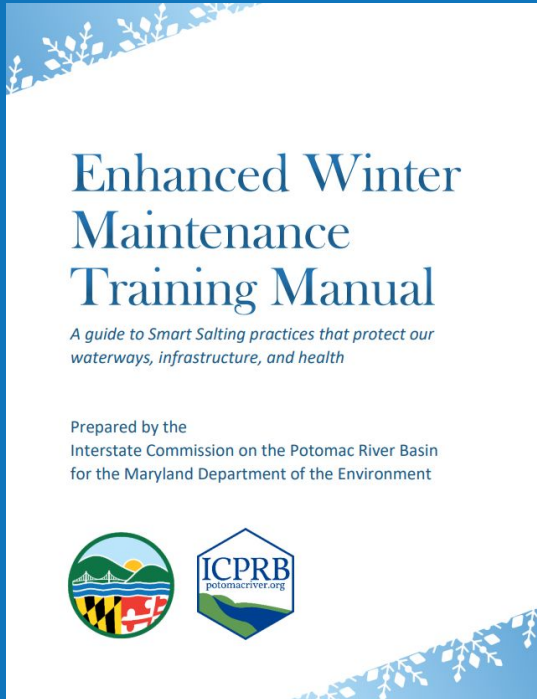
# Source Reduction Key Strategies

1. State Highway Administration's Statewide Salt Management Plan
2. Salt Management Plans developed and implemented in areas covered under stormwater permits [Municipal Separate Storm Sewer System (MS4)]
- 3. Voluntary applicator training**  *Focusing on this strategy for this presentation*
4. Education and outreach
5. Permit requirements for other potential point sources



# Training Program Background

- Following the lead of other states in developing a voluntary training program



- MDE contracted Interstate Commission on the Potomac River Basin (ICPRB) to create a comprehensive training manual **focused on smaller paved surfaces (sidewalks, parking lots, small roads)**
- Training manual completed in 2023
- MDE Smart Salting Training Program developed from this training manual

**Free to download!**



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# Training Program Partners

- **Maryland Department of the Environment (MDE)**
  - Spearheads project
  - Oversees training program development and implementation
  - Subsidizing training program
- **University of Maryland Environmental Finance Center (UMD EFC)**
  - Manages online course and training program administration
- **Chesapeake Conservation Landscaping Council (CCLC)**
  - Subject matter expert and instructor



# Training Program Format

- Hybrid training program: Mix of online and in-person content
- Online learning modules
  - 6 short videos that follow training manual
    - Self-paced learning
  - Knowledge checks
- In-person workshop
  - Review training manual and online modules
  - Outdoor stations
  - Interactive and discussion-based
- Online, open-note final exam
  - ~30 multiple choice questions



# Learning Modules

*Focus: Smaller paved surfaces (sidewalks, parking lots, small roads)*

- Module 1 – Why Should I Reduce Winter Salt Use?
- Module 2 – What is Smart Salting?
- Module 3 – Pre-Season Preparations
- Module 4 – Site Planning and Contracts
- Module 5 – Storm Operations
- Module 6 – Post-Storm and End of Season Actions



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# Length of Training Program

- \$100 registration fee (covers UMD EFC and CCLC administrative costs)
- Typically offered in the fall
- Online platform available a month in advance of workshops
- Workshop days held in September, October, or November
- Participants have until December to complete and pass final exam
- MDE Smart Salt Professional certificates earned




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# Training Program Numbers

- 2023 – 2024: First Year / Pilot Year
  - 2 half-day workshops
  - **21 participants earned certificate and completed program**
- 2024 – 2025: Second Year
  - 2 half-day workshops
  - **54 participants earned certificate and completed program**
- 2025 – 2026: Third Year
  - 4 full-day workshops
  - **145 participants earned certificate and completed program**
- Fourth Year (2026 – 2027) and Fifth Year (2027 – 2028)
  - **Aiming to train 200 participants each year**



# Training Program Summary

- 220 MDE Smart Salt Professionals trained with MDE Smart Salting Training Program since Winter 2023
- Help share and promote the training program with your network!  Training Program Interest List



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LEARN MORE ABOUT  
WINTER SALT FROM MDE



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JOIN THE INTEREST LIST FOR  
MDE'S SMART SALTING  
TRAINING PROGRAM

# Thank You!

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# Questions?



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